

# FIG. 1

CONSTRUCTION OF IEEE 1394 BUS TO WHICH  
CONVENTIONAL BUS ANALYZER IS CONNECTED

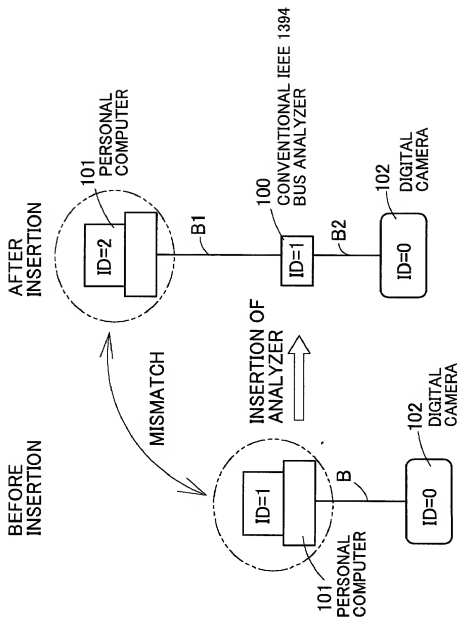


FIG. 2

CONSTRUCTION IN WHICH CONVENTIONAL BUS ANALYZER IS CONNECTED TO IEEE 1394 BUS TO WHICH A NUMBER OF DEVICES ARE CONNECTED

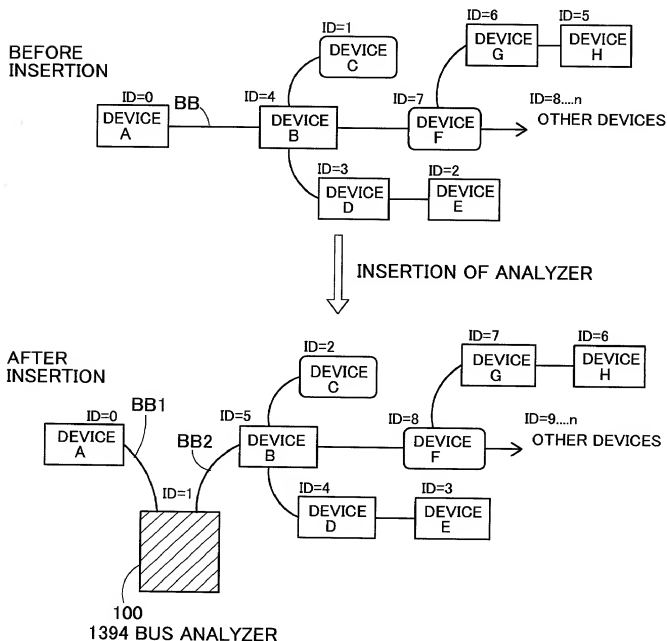


FIG. 3

CONSTRUCTION IN WHICH BUS ANALYZER OF FIRST EMBODIMENT  
IS CONNECTED TO IEEE 1394 BUS

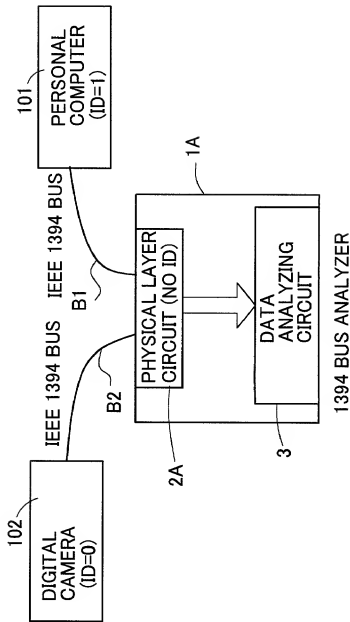


FIG. 4

STATE TRANSITION DIAGRAM SHOWING TREE — IDENTIFYING OPERATION  
IN FIRST EMBODIMENT

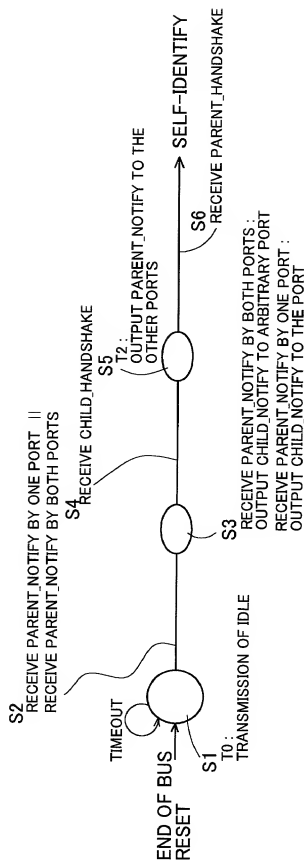
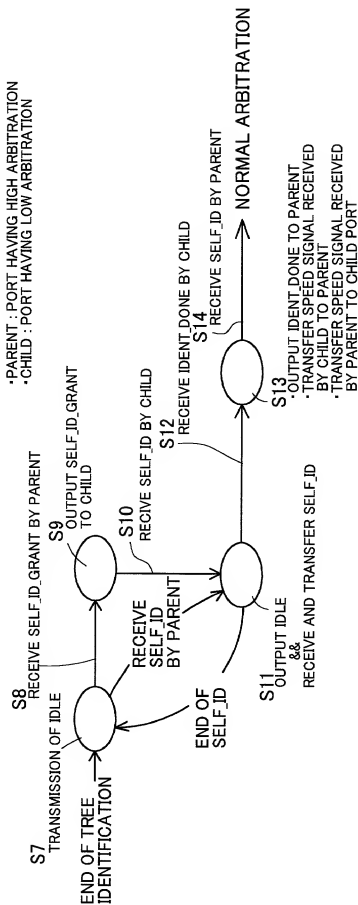


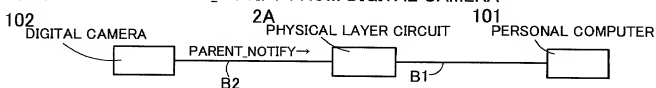
FIG. 5

STATE TRANSITION DIAGRAM SHOWING SELF-IDENTIFYING  
OPERATION IN FIRST EMBODIMENT

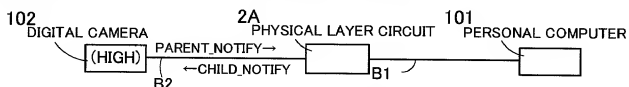


**FIG. 6** TREE-IDENTIFYING OPERATION IN FIRST EMBODIMENT  
(RECEIVE PARENT\_NOTIFY BY ONE OF PORTS)

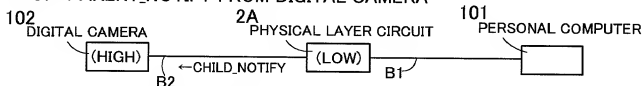
(P1) RECEIVE PARENT\_NOTIFY FROM DIGITAL CAMERA



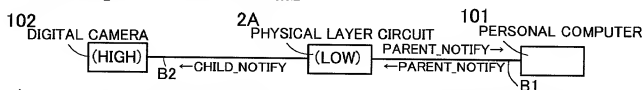
(P2) OUTPUT CHILD\_NOTIFY TO DIGITAL CAMERA



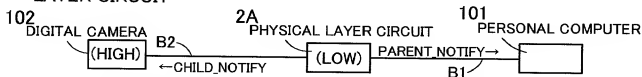
(P3) RECEIVE CHILD\_HANDSHAKE BY STOPPING OUTPUT OF PARENT\_NOTIFY FROM DIGITAL CAMERA



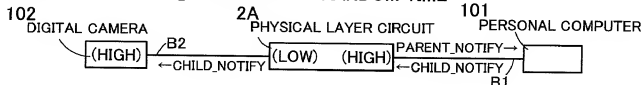
(P4) OUTPUT PARENT\_NOTIFY TO THE OTHER PORT RECEIVE ROOT\_CONTENTION WHEN PERSONAL COMPUTER ALSO OUTPUTS PARENT\_NOTIFY AT THIS TIME



(P5) STOP OUTPUTTING PARENT\_NOTIFY FROM PERSONAL COMPUTER BUT CONTINUOUSLY OUTPUT PARENT\_NOTIFY FROM PHYSICAL LAYER CIRCUIT



(P6) RECEIVE PARENT\_HANDSHAKE WHEN PERSONAL COMPUTER OUTPUTS CHILD\_NOTIFY AFTER RANDOM TIME



(P12) STOP OUTPUTTING SIGNALS FROM BOTH PORTS, THEREBY FINISHING TREE-IDENTIFYING OPERATION

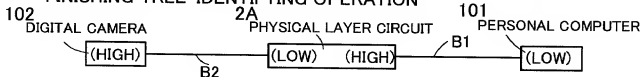
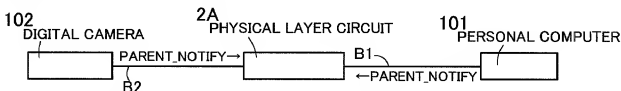


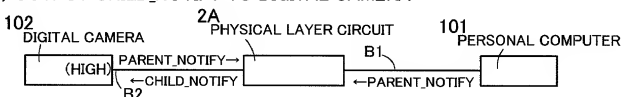
FIG. 7

TREE-IDENTIFYING OPERATION IN FIRST EMBODIMENT  
(RECEIVE PARENT\_NOTIFY BY BOTH PORTS)

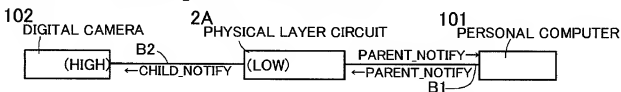
(P7) RECEIVE PARENT\_NOTIFY FROM BOTH DEVICES



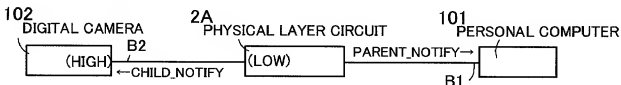
(P8) OUTPUT CHILD\_NOTIFY TO DIGITAL CAMERA



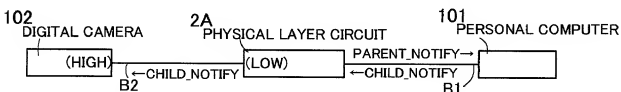
(P9) STOP OUTPUTTING PARENT\_NOTIFY FROM DIGITAL CAMERA TO THEREBY RECEIVE CHILD\_HANDSHAKE, AND OUTPUT PARENT\_NOTIFY TO PERSONAL COMPUTER. RECEIVE ROOT\_CONTENTION WHEN PERSONAL COMPUTER ALSO OUTPUTS PARENT\_NOTIFY AT THIS TIME.



(P10) STOP OUTPUTTING PARENT\_NOTIFY FROM PERSONAL COMPUTER BUT CONTINUOUSLY OUTPUT PARENT\_NOTIFY FROM PHYSICAL LAYER CIRCUIT



(P11) OUTPUT CHILD\_NOTIFY FROM PERSONAL COMPUTER AFTER RANDOM TIME, THEREBY RECEIVING PARENT\_HANDSHAKE



(P12) FINISH TREE-IDENTIFYING OPERATION

